

SECTION 205

OVERHAUL

- **205.1 Description.** This work shall consist of authorized hauling in excess of the free-haul distance. Free-haul distance is the specified distance that excavated material shall be hauled without additional compensation. The free-haul distance is 2000 feet (600 m) for Overhaul (Station).
- **205.1.1** If the contract documents show no pay item for overhaul, then no direct payment will be made for such work, even if the plans show hauling beyond the free-haul distance.
- **205.1.2** Contract quantities of overhaul will be the basis of payment for all overhaul in any balance, unless the engineer:
- (a) Authorizes a change in grade resulting in a net average change in elevations of more than 6 inches (150 mm) from the plan grade line in any balance.
- (b) Authorizes substantial change in the typical section from the section shown on the plans.
 - (c) Requires changes in plan locations for sources of borrow.
- (d) Determines that the actual borrow quantities differ from the plan quantities in balances where overhaul has been computed on borrow quantities only.
 - (e) Determines that there is a substantial error in the contract quantity.
- **205.1.3** In cases where the condition described as (c) or (e) occurs, the quantity of overhaul for the balances so affected will be computed. In cases where one or more of the conditions described as (a), (b) and (d) occurs, the pay quantity of overhaul will be increased or decreased from the contract quantity in the ratio that the contract quantity of excavation bears to the actual quantity in the affected balance limits.
- **205.1.4** Plan location will be used to compute overhaul if a change in location of borrow or waste areas as proposed by the contractor has been approved.
- **205.2 Method of Measurement.** The limit of free-haul will be determined from a mass diagram by fixing on the volume curve, two points, one on each side of the neutral grade point, one in excavation and the other in embankment, such that the distance between them equals the free-haul distance, and the included quantities of excavation and embankment are in balance. All material within the free-haul limit will be eliminated from further consideration. The distance between the center of gravity of the remaining mass of excavation and the remaining mass of embankment minus the free-haul distance will be the overhaul distance.
- **205.2.1** The overhaul distance for Overhaul (Station) will be measured to the nearest full station, 100 feet (made to the nearest 1/10 station, 100 m). The quantity of overhaul will be the product of the overhaul distance multiplied by the quantity in cubic yards (cubic meters) of

material hauled in excess of the free-haul distance, and will be made in units of station yards (made in units to the nearest 0.1 station m^3).

- 205.2.2 The overhaul distance for material obtained from borrow areas or disposed of in waste areas and hauled over the shortest practicable route will be one-half the round-trip distance made by the equipment less the free-haul.
- **205.2.3** Analytical methods may be used for computing overhaul in lieu of the mass diagram method described herein.
- **205.3 Basis of Payment.** The quantity of overhaul measured as provided above will be paid for at the contract unit price. Payment will not be made for overhaul of material secured from excavation made because of the failure of the contractor to observe the balance points established on the plans or as staked, unless such deviation was directed by the engineer.